

REMARKS

Claims 1-13 are pending in the application, are rejected, and are at issue.

In response to paragraph 1 of the detailed action, the attorney docket number has been deleted in paragraph 1 and in paragraphs 44 and 45 the reference to a step 3 and a step 4 have been corrected to reference to an activity 3500 and an activity 3600.

Attached hereto are corrected drawing sheets for the sheet including Fig. 1 and the sheet including Fig. 3. In Fig. 1, individual boxes have been placed about reference numerals 1105, 1120, 1130 and 1140 within a box for element 1170. This is consistent with the association of these elements described in paragraphs 24, 25 and 27. An arrow from element 3510 to element 3520 is added in Fig. 3. This is consistent with the description in paragraphs 44 and 46. Approval is requested.

Applicant traverses the rejection of claims 1-12 as being directed to non-statutory subject matter.

By this amendment, independent claim 1 is amended to specify a method for scheduling a fabrication process including storing a job set in a memory device and operating an information processing system using the memory device. Corresponding changes are made to claims 4 and 5. As such, claims 1-11 are directed to statutory subject matter.

Claim 12 is directed to a machine-readable medium containing instructions for activities. This claim is not directed to storing mental steps on a medium. It is directed to a medium, which is itself a physical device. Nevertheless, to clarify the invention, claim 12 is amended to specify that the instructions in the machine-readable medium are accessible by an information device.

The rejection under §101 ought be withdrawn.

Applicants traverse the rejection of claims 1-6 as anticipated by Ho et al. “Minimizing the number of tardy jobs for m parallel machines”.

Independent claim 1 specifies a method for scheduling a fabrication process comprising the activities of initializing a job set to create a set of on time jobs, a set of late jobs and a set of jobs to be scheduled and storing the jobs in a job set in a memory device. An information processing system is operated to select a job with a minimum value based on due dates and processing requirements and adding the job to the set of on time jobs, to determine if the set of on time jobs will not exceed scheduled due dates, and modify the set of on time jobs in the memory device if the set of on time jobs exceeds the scheduled due dates.

An anticipation can only be established by a single reference describing each and every element of the claim, arranged as in the claim. Ho et al. does not anticipate claim 1. The claimed invention selects a job with a minimum value based on due dates and processing requirements and adds the job to the set of on time jobs. Thereafter, a determination is made if the set of on time jobs will not exceed scheduled due dates. The set of on time jobs will be modified if the set of on time jobs exceeds the scheduled due dates. As such, the claim is analyzing a set of on time jobs relative to a scheduled due date to ensure that the set of on time jobs will not exceed the scheduled due date.

The action particularly references the job-focused approach discussed in Ho et al. on pages 346 and 347. The procedure described there is different from that in the claimed invention. With the job-focused approach, the approach “assigns jobs one by one, while considering all m identical machines simultaneously”. Particularly, a determination is made if any of the parallel machines can

process the selected job in a timely manner. If not, then the selected job is rejected. It does so by taking m machines into account concurrently. As such, this approach is not adding a job to a set of on time jobs and determining if the set of on time jobs exceeds the scheduled due date. Determining if any machine can handle a selected job in a timely manner is distinct from determining whether the addition of a job to a job will exceed a scheduled due date.

As such, Ho et al. does not disclose each and every step recited in claim 1 and there can be no anticipation. Moreover, Ho et al. does not suggest the claimed method. Therefore, any obviousness rejection would also be improper.

Claims 2-6 depend from claim 1 and are believed allowable for the same reasons therefor.

For the above reasons, claims 1-6 are believed allowable and withdrawal of the rejection is requested.

Applicants traverse the rejection of claims 11-13 as obvious over Ho et al. and further in view of Spoltore et al. publication No. US 2004/0015971.

Claim 11 depends from claim 1, discussed above, and specifies that the fabrication process includes jobs for fabricating metal works.

The deficiencies with respect to Ho et al. are noted above. Spoltore et al. do not disclose or suggest these deficiencies. Instead, Spoltore is cited for use of a computer implementing a scheduling system and applying it to factory scheduling problems. As a result, the combination does not result in the claimed invention. Therefore, claim 11 is believed allowable.

Independent claim 12 specifies a machine readable medium containing instructions for activities. The instructions in the machine-readable medium are accessible by an information device

and comprise initializing a job such to create a set of on time jobs, a set of late jobs and a set of jobs to be scheduled, selecting a job with the minimum value based on due dates and processing requirements and adding the job to the set of on time jobs, determining if the set of on time jobs will not exceed scheduled due dates, and modifying the set of on time jobs if the set of on time jobs exceeds the scheduled due dates.

As discussed above, Ho et al. does not utilize such instructions. Instead, Ho et al. compares an individual job to a plurality of parallel machines to determine if any of the machines can process the job. These deficiencies are not disclosed in Spoltore et al. Therefore, the combination does not result in the claimed invention. Nor does the combination suggest the invention. Claim 12 is not obvious.

Independent claim 13 specifies a device for providing a representation of user screens for a human machine interface (HMI) comprising means for initializing a job set to create a set of on time jobs, a set of late jobs and a set of jobs to be scheduled. Means are provided for selecting a job with a minimum value based on due dates and processing requirements and adding the job to the set of on time jobs. Means determine if the set of on time jobs will not exceed scheduled due dates. Means provided for modifying the set of on time jobs if the set of on time jobs exceeds the scheduled due dates.

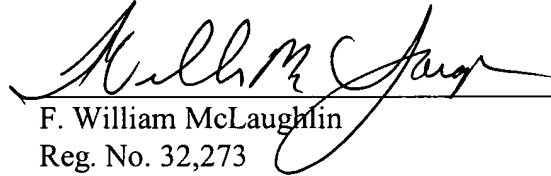
Claim 13 is believed allowable for the same reasons discussed relative to claims 1 and 12. Particularly, the references, alone or in any proper combination, do not disclose any device performing this function. As such, no combination of the references results in the claimed invention. Therefore, claim 13 is not obvious.

For the above reasons, claims 11-13 are believed allowable and withdrawal of the rejection is requested.

Reconsideration of the application and allowance and passage to issue are requested.

Respectfully submitted,

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